THE CORRELATIONSHIP BETWEEN THE PERFORMANCE OF STUDENTS AND THE COMMITMENT OF FACULTY MEMBERS IN AN INSTITUTION OF HIGHER LEARNING – A PILOT STUDY

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ABSTRACT

Many institutions of higher learning, both public and private, in a developing country are constantly striving to increase the performance of the students in order to achieve excellence in academic achievements. One of the key factors in guiding the performance of the students is thought to be the commitment of the faculty members. This research tests this hypothesis through qualitative and quantitative survey and analyses of the undergraduate students in an accredited institution of higher learning. The surveyed attributes of the faculty members were confined to the respondent background, stewardship, instructional materials, and teaching skills. The surveyed attributes of the students were entry qualifications and performances in the institution, namely the cumulative grade point average. In a multi-racial country like Malaysia, other tested attributes of the faculty members were age, highest achievable academic qualification, position held, race, and marital status. Other related tested attributes of the students were race, age, and highest attainable qualification prior to their undergraduate study. It was found that the co-relation between the commitment of the faculty member and the students' performance is weak. Instead, the commitment of the faculty member in a qualitative sense is management-related with several key critical issues which are dependent on the management of the institution. These critical issues are policy related: expectations from the faculty members, support from the management team, lack of awareness on the roles of the faculty members, and lack of awareness on the key success factors of the institution in moving forward.

INTRODUCTION

The process of education involves training the young in a society by the adults in the knowledge and skills they would need to master and eventually pass on to the subsequent generation. The evolution of culture, and human beings as a species depended on this practice of transmitting knowledge which increases exponentially in time. Education encompasses both the teaching and learning of knowledge. All formal education consists of systematic instruction, teaching and training by professional lecturers in different disciplines. Education is now considered as a fundamental human right as spelled out in 1952, Article 2 of the first Protocol to the European Convention on Human Rights and finally at the world level, the United Nations' International Covenant on Economic, Social and Cultural Rights of 1966 which guarantees this right under its Article 13.

Under the Rancangan Malaysia Ke (RMK) 9 (2007), the Government of Malaysia (GOM) encourages the fundamental development of Malaysia as an education hub in the ASEAN region. This provides an impetus for the growth of private universities in Malaysia which in the past is only facilitated by the public universities with limited places available even to the qualified students.

At the organizational level, committed employees normally put on a greater effort at their workplace (O'Malley, 2000). It was shown that high commitment entails a caring attentiveness, stewardship and conscientious towards the relationship that the employees is in. In the teaching profession, lecturers' commitment and engagement has been identified as one of the most critical factors in the success and future of education (Huber, 1999, Nias, 1981). A study conducted by Kusman (1992) found a significant association between organizational dynamics of the teacher workplace, commitment and academic achievements. All of the studies mentioned above concluded that there is a positive link between commitment and students' academic achievement and student quality. In the teaching environment, literature review indicated that studies are generally confined to the kindergarten level (Seifert & Atkinson, 1991), primary school level (Abdul Manaf, 1998) and the secondary school level (Darchan Singh, 1998), (Shann, 1998), and Burrows & Munday, (1996).

There are limitations related to the study on this subject matter at the higher education level. Literature indicated that the majority of the research focuses on the commitment of employees towards the working organization. There are lack of research conducted

on the commitment of lecturers in relation to the performance of the students although literature review stated earlier indicated potential link between commitment of lecturers and the performance of the students. Further, the majority of the research conducted in the areas of commitment of lecturers is confined to the west. Locally, there is limited research conducted in this area although some attempts have been made to discuss the commitment of teachers only at the primary and secondary school levels only.

In the academic environment, lecturers are constantly faced with many challenges to develop students' performance to the level of excellence and at the same time to follow through with the organizational goal, mission and vision. Many researches in other countries have attempted to find the root cause related to commitment of lecturers within the confine of the organization only. Typically, these root causes range from financial satisfaction to work environment and the management of the university. This fulfils only the professional relationship between the lecturers and their organization and to what degree are they professionally committed.

In the past, private universities in Malaysia are generally established to cater to the educational needs of the students who are generally unable to secure an academic place locally in the public universities and who are unable to finance their education abroad due to lack of funds. The shortage of qualified faculty members to cater to all the institutions of higher learning in the country is becoming an issue in this country currently.

OBJECTIVE

The primary objective of the study is to investigate the extent of the lecturers' commitment and its correlation to the students' performance, and whether the instructional materials, teaching skills and lecturers' stewardship can be considered as part of the commitment and its impact to the students' performances. The students' performance is measured in the form of Cumulative Grade Point Average (CGPA). An actual survey is made on a sample population of a private university located in the Klang Valley. Nevertheless, this is a pilot study which will be expanded further in the future. In addition, the study also attempts to ascertain whether there are any problems and barriers which may affect the lecturers' commitment.

The significance of the study is to obtain the correlation of the lecturer's commitment and the student's performance for two obvious reasons. First, it provides quantified information on the determinants related to academic achievement of the students. Specifically, the results of this study will provide academician and university administrator with reliable information on the commitment of lecturer in relation to the students' academic achievement. In Malaysia, and in particular, at the private university, there are practically none to few studies which have been conducted on the lecturers'

commitment as a strong factor in relation to the students' performance. Thus, these committed lecturers are impetus in the development of students who are capable and well prepared source of human capital in Malaysia. Secondly, it is hopeful that the findings will help the lecturers at the university to re-evaluate their commitments and to come out with new strategies so that the students can enhance their academic achievement.

Although the subject matter of the report is interesting, the following are the limitations of this study:

i. The study only concentrates on a private university which is located in the Klang Valley. Thus, this study cannot be generalized to other private universities in Malaysia which may require actual analysis of data obtained for the universities.

ii. This study is limited to the private university lecturers – deans, deputy deans, senior lecturer and lecturer only, who are involve in teaching and learning.

iii. Lack of previous studies on private universities in Malaysia since commitment and performance are generally not 'tested' for its effectiveness. Thus, this study is basically exploratory in nature.

RESEARCH METHODOLOGY

This section presents an overview on the methodology applied for the research conducted and report presented herein. Figure 1 presents the design framework for the research. The key criterion of the framework is to ensure consistency on the perception of commitment by the lecturers and the students. As shown in Figure 2, the following methodology is adopted:

a. A preliminary survey is carried out for the students and the lecturers. The students were given a set of questionnaires to ascertain what attributes of the lecturers are important influencing factor affecting their performance. Similarly, the lecturers were provided with a set of questionnaires to determine their perception on the attributes of commitments. Both set of questionnaires are designed similarly to ensure consistency in the final results and to minimize errors related to the design of the questionnaires

b. A final survey was carried out for the students. The final survey includes only selected attributes on commitment of the lecturers which is of importance to the students. These selected attributes on commitment were derived from the preliminary survey.

c. A statistical analysis was then made on the performance of the students versus the attributes on commitment of the lecturers. Results from the statistical analysis were used to quantify the degree of significance of the attributes on commitment.

d. Once the attributes on commitment have been ranked accordingly, the perceived attributes on commitment surveyed from the lecturers are used to compare with the

ranked attributes on commitment from the analysis. A simple gap analysis will be made. Finally, recommendation for future research and conclusion is made on the analysis and gap study.
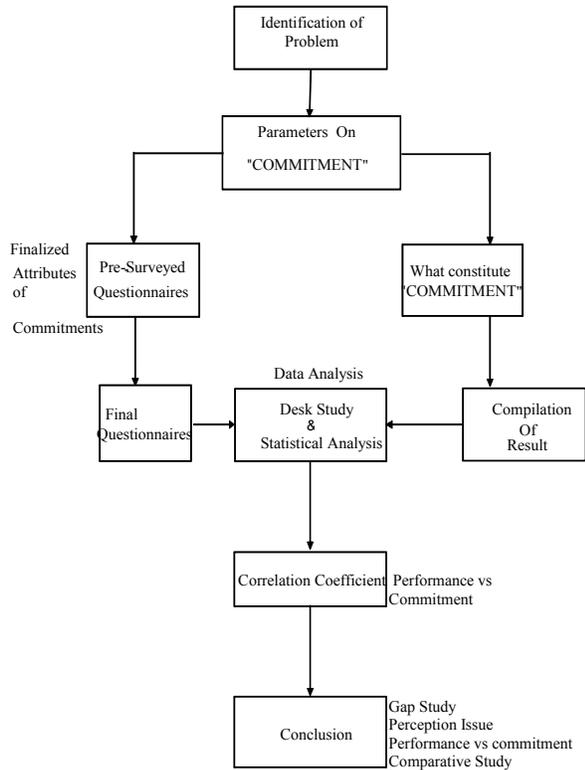

Figure 2: Proposed Design

A preliminary survey to ascertain the attributes of the commitment of the lecturers by the student was made to the undergraduate students. A sample size equivalent to approximately 10% of the population was surveyed. Preliminary questionnaires were distributed to students which outlined the attributes of commitment of the lecturers as perceived by them to have the most influence on their performance as students. Well defined questionnaires were employed to prevent students from deviating from the main objective of the preliminary survey. This survey is intended to size up only key areas on the attributes related to the commitment of the lecturers as commonly perceived by the students to affect their performance.

The questionnaires were developed, improved, and modified from existing Teaching Evaluation Result (TER) by the students. Once the results of the final survey have been tabulated, a statistical analysis utilizing SPSS version- 12 (2007) software is used to obtain the correlation factors

between the dependent variable made up of the students' performance and the independent variables made up of teachers' commitments. In addition to this, Spearman Rank Order Correlation is use to measure the strength of the relationship between the two variables.

The undergraduate students surveyed have generally completed their Sijil Pelajaran Malaysia (SPM), and Sijil Tinggi Pelajaran Malaysia (STPM). Only lecturers who are responsible to teach these students with more than five years of experiences in the teaching environment will be surveyed. The total number of respondents selected for the survey is three hundred students (300), and twenty five (25) lectures. Lecturers were informed of the purpose of the study and that responses to the items on the questionnaires were kept anonymous. Respondents were given detailed information on the main purpose, content of the questionnaires and only to choose one answer to each question which shall be based on Likert Scale as follows: Strongly agree (5), Agree (4), Neutral (3), Diagree (2), and Strongly disagree (1).

The Teaching Evaluation Result (TER) was used to measure the variables of lecturers' commitment and students' performance, respectively. In addition, students' performance was collected based on the Cumulative Grade Performance Achievement (CGPA). The Teacher Evaluation Result (TER) was developed as measure of three dimensions of lecturers' commitment. They are: A) Background Information, B) Stewardship and Quality, C) Teaching Skills, and D) Instructional Materials. Thirty six (36) items were identified to measure three dimensions of lecturers' commitment including the background information of respondent. These were:

Section A: **Respondent Background Information**
This section contains five (5) items that include gender, race, age, faculty and the highest level of qualification.

Section B: **Lecturers Stewardship**
This section contains ten (10 items) which are related to the level on exposure of students towards the commitment of the lecturers. This section focused on the perception of the students on the attributes of the commitment of the lecturers which affect their performance.

Section C: **Instructional Materials**
This section contains eight (8 items) which are related to the importance of building up the materials for students understanding of the subject matter and the updated materials can be considered as the commitment of the lecturer and their seriousness in teaching the students.

Section D: **Teaching Skill**
This section contains thirteen (13 items) which are related to the skills possessed by the lecturer in teaching the students. This section

is important to see the effectiveness and ineffectiveness of students to perform in class.

Cronbach's α is use to test the reliability of data. Measurement made in this study was judged to be reliable if Cronbach's coefficient alpha is 0.7 or greater. Pre-test was conducted on ten (10) respondents and the result of the pre-test indicate that the Cronbach's coefficient alpha is greater than 0.7 (see Table 1). This indicates that the instruments were suitable. Thus, the questionnaires were reliable.

Table 1
Cronbach's Alpha

Variable	Number of items	Cronbach's Alpha Value
Lecturers stewardship	10	0.967
Instructional Materials	8	0.912
Teaching Method/Skills	13	0.908

Four faculties were surveyed. The results encompassed two major aspects i.e., the Pearson correlation factors in which the degree of importance of the attributes on commitment will be ascertained and the overall statistics on the adequacy of the performance and commitment of the lecturers are quantified. A test on the questions that the students' performance is correlated with the lecturers' commitment is also made.

In this research presented herein, multiple linear regression method is used. It is assumed that the results obtained from the survey are normally distributed. Mathematically, the multiple linear regression models can be written as:

$$Y = \beta_0 + \beta_1 X_1 + \beta_2 X_2 + \ldots\ldots + \varepsilon$$

where: β_0 is the Y-intercept
$\beta_1, \beta_2, \ldots$ are the population parameters
ε is the random error term
$X_1, X_2, \ldots\ldots$ are the independent variables
Y is the dependent variable

Descriptive statistics and parametric studies using multiple linear regressions are conducted on the results of the survey from the students and the lecturers. This involves a quantitative analysis of the results. In addition, a qualitative analysis is also made on the responses from the lecturers on their perception of commitment. The questionnaires for the students and for the lecturers are carefully designed to draw a parallel relationship between the two questionnaires on the qualitative aspect related to the commitment of the lecturers.

RESULTS OF ANALYSES

1. Demography of Students: Table 2 summarizes the basic demography of the students. From Table 2, it can be seen that the female students outnumbered male students by a factor of slightly more than two (2) times. The majority of the students sampled are ethnically Malay and Indian, with both races made up 86% of the respondents. It was found that 80% of the age group is below 22 years of age. The students are quite uniformly distributed on their educational level prior to entering into the university with 54% at the Sijil Pelajaran Malaysia (SPM) level and 46 % of the students sampled at the Sijil tinggi Pelajaran Malaysia (STPM) level.

Table 2:
Students Demography

Section	Qualitative Description	N	Percent (%)
A1 Gender	Male	85	30.5
	Female	**194**	**69.5**
	Missing	11	
	Total	290	100.0
A2 Race	**Malay**	**127**	**44.3**
	Chinese	20	7.0
	Indian	122	42.5
	Others	18	6.2
	Missing	3	
	Total	290	100.0
A3 Age	**18-20**	**135**	**46.6**
	21-22	100	34.5
	23-24	43	14.8
	> 25	12	4.1
	Missing	0	
	Total	290	100.0
A4 Faculty	FBA	106	36.8
	FESS	**138**	**47.9**
	FIT	9	3.1
	FHTM	35	12.2
	Missing	2	
	Total	290	100.0
A5 Educational Level	**SPM**	**151**	**54.5**
	STPM	127	45.5
	Missing	11	
	Total	290	100.0

2. Demography of the Lecturer: Table 3 summarizes the demography of the lecturers. It can be seen that female lecturers outnumbered male lecturers by a factor of approximately five (5) times. About 75% of the lecturers are Malay. The Chinese lecturers represent only 21% of the lecturers surveyed.

   The majority of the lecturers (60%) are within the age group of 31 to 50 years old. This is also attributed to the survey requirement which state that the survey is made only on lecturers with at least five (5) years of working experience. Almost 75% of the lecturers are married or married with children and most of the lecturers (84%) have at least a master degree. The tenure level of the lecturers surveyed is approximately 60% at the lecturer level and 12% at the senior lecturer level. The surveyed heads of department are also member of the teaching force and not strictly administrative in nature. Further, at least 68% of the lecturers have five (5) to twenty (20) years of teaching experience. This is by far the largest group in term of years of teaching experience. It is noted herein that all the lecturers surveyed are based on a voluntary basis when the survey is first proposed to them.

3. Descriptive and Statistical Analyses: Table 4 summarizes the results obtained from the Pearson Correlation for the student group surveyed as a whole. In this case, the Cumulative Grade Point Average (CGPA) is used to correlate with Sections B (lecturers' stewardship), C (instructional materials), and D (teaching skills).

Table 3
Lecturers Demography

Section	Qualitative Description	N	Percent (%)
A1 Gender	Male	4	16.7
	Female	**20**	**83.3**
	Missing	1	
	Total	25	100.0
A2 Race	**Malay**	**17**	**73.9**
	Chinese	5	21.7
	Indian	1	4.4
	Missing	2	
	Total	25	100.0
A3 Age	25-30	4	16.0
	31-40	**9**	**36.0**
	41-50	6	24.0
	> 51	6	24.0
	Missing	0	
	Total	25	100.0
A4 Marital	Single	6	24.0
	Married	9	36.0
	Married with children	9	36.0
	Others	1	4.0
	Missing	0	
	Total	25	100.0
A5 Educational Level	Bachelor	4	16.0
	Master	**16**	**64.0**
	PhD	5	20.0
	Missing	0	
	Total	25	100.0
A6 Position/ Occupation	Head of Department	7	28
	Lecturer	**15**	**60**
	Senior Lecturer	3	12
	Missing	0	
	Total	25	100.0
A7 Years Experience	< 5	3	12.0
	5-10	8	32.0
	11-20	**9**	**36.0**
	> 21	5	20.0
	Missing	0	
	Total	25	100.0

Table 4
Pearson Correlation of CGPA,

		CGP	B	C	D
Correlation					
CGP	Pearson	1	.08	.04	.07
	Sig. (2-	.	.14	.43	.22
	N	28		28	28
B	Pearson	.08	1	.87 *	.84 *
	Sig. (2-	.14	.	.00	.00
	N	28	29	28	29
C	Pearson	.04	.87 *	1	.85 *
	Sig. (2-	.43	.00	.	.00
	N	28	28	28	28
D	Pearson	.07	.84 *	.85 *	1
	Sig. (2-	.22	.00	.00	.
	N	28	29	28	29

** Correlation is significant at the 0.01 level (2-

Within the group, it was found that the Pearson correlation between Section B and Section C is at 0.871, the Pearson correlation between Section B and Section D is at 0.848, and finally the Pearson correlation between Section C and D is at 0.852. There are strong statistical links between Sections B, C, and D as indicated in Table 4.

Statistically, there is no significant evidence to support question the correlation between CGPA and all the Sections at α value of

0.01. Numerically, there is a weak correlation between CGPA and Sections B, C, and D.

The mean CGPA is 3.05 with a minimum CGPA of 1.95 and a maximum CGPA of 4.0. The standard deviation of the CGPA is 0.51. The total number of students surveyed was 284. Only 4 % of the students attained a CGPA of less than 2.

The responses by the students to the questionnaires have a strong tendency towards agreeing to the attributes set-forth in the questionnaires related to the commitment of the lecturers i.e., the mean score of 3.60 on all the attributes. The questionnaires have been designed in such a way that if the score is greater than 3.0, the positive aspects of the lecturers are pronounced for sections B, C, and D. This supports the overall students' perception of the lecturers' commitment as positive based on the attributes given. Hence, the instructional materials, lecturers' stewardship, and teaching method or skills are deemed adequate by the students surveyed.

Similar analyses on the responses of the lecturers to the attributes of commitments indicated that the lecturers generally accepted that such attributes are reflection of their commitments. The average score of the responses to the attributes exceeded 3.8 in comparison with 3.6 rated by the students.

The group statistics are next analyzed to detect any differences related to the responses of the students based on their demography. This is to establish the relevance and uniformity of the students in responding to the questionnaires statistically in order to support question two. The statistical analysis related to the responses to the questionnaires based on the gender was measured and at α level of 0.05, it was found that there is no significant evidence to support the fact that the variances and means related to the gender on the responses to the questionnaires are different. Thus, the gender perceived the attributes on commitments uniformly.

Using Levene's test for equality of variances and t-test for equality of means, it was found that the means and variances of the responses from the students due to their educational level are not significant at α level of 0.05.

Table 5 summarizes the ANOVA (Analysis of Variance) on the effect of racial composition to the responses of the questionnaires. This analysis is conducted to test the variances of the students' responses to the questionnaires due to ethnicity. This is important since the majority of the composition of the students is made up of Malay and Indian. It was found that at an α level of 0.05, there is no significant evidence to indicate that there are variances on the responses of the students ethnically.

Based on the results shown in Table 6, and at α level of 0.05, it was found that there is no significant evidence to support any variances shown by the age group to the questionnaires.

Table 5
Test of Variances on the Responses of the Students of various Races

ANOVA

		Sum of Squares	df	Mean Square	F	Sig.
B	Between Groups	337.638	3	112.546	1.583	.194
	Within Groups	20124.300	283	71.111		
	Total	20461.937	286			
C	Between Groups	144.950	3	48.317	1.150	.329
	Within Groups	11721.360	279	42.012		
	Total	11866.311	282			
D	Between Groups	389.820	3	129.940	1.002	.392
	Within Groups	36686.717	283	129.635		
	Total	37076.537	286			
CGPA	Between Groups	1.858	3	.619	2.419	.066
	Within Groups	71.953	281	.256		
	Total	73.811	284			

Similarly, and based on α level of 0.05, there is no significant evidence to show that the responses of the students are significantly different due to their enrollment at various faculties and age group (using ANOVA).

From the above findings, it can be concluded that instructional materials, teaching skills, lecturers' stewardship can be considered as positive attributes of commitments which have been perceived by the students to be related to the performance. This is also supported by Table 3 above where the Pearson correlation between Section B and Section C is 0.87, the Pearson correlation between Section B and Section D is at 0.85, and finally the Pearson correlation between Section C and D is at 0.85. In addition, the perception on the attributes of the commitment of the lecturers is well conceived by the students and the lecturers.

RESULTS OF ANALYSES

The results presented herein are based on quantitative analyses only. As such qualitative discussion on findings is not discussed in this paper.

a. The study revealed that there is no significant statistical relationship or correlation between the commitments of the lecturers and performance of the students. At best, there exists a weak correlation between the commitments of the lecturers and the performance of the students. The correlation factor between the commitments of the lecturers and the performance of the students was

found to be only 0.or approximately 20% based on linear multiple regression statistical model.

b. The attributes used in the survey related to the three (3) major categories or areas i.e., instructional materials, teaching skills, and lecturers' stewardship have high correlation factor of at least 0.85 from one another. The analyses indicated that the attributes are generally adequate to represent the commitment of the lecturers and they are related to one another with high degree of consistency.

c. The attributes related to the three (3) major categories or areas have been perceived to be positive by the lecturers and the students alike. Further, the perception of the students on these attributes is homogeneous statistically indicating that there is no significant variation on the perception of the students on the attributes as a result of their gender, race, age group, faculty of their study, and highest level of education.

Recommendation for future research includes the following:

d. To incorporate other additional commitment measures and attributes into the questionnaires related to the commitment of the lecturers to enhance the correlation factor of the performance of the students and the commitment of the lecturers. This can be carried out using linear multiple regression models where the additional commitment measures and attributes are the independent variables.

e. To incorporate other additional attributes of the students other than just the Cumulative Grade Point Average (CGPA) as the dependent variables. In this case, multivariate regression models can be used.

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